

In the claims:

Please substitute the following full listing of claims for the claims as originally filed or most recently amended.

1-21. (Canceled)

22. (Previously presented) An integrated circuit including

    a first layer having metal or metal alloy at a surface thereof,

    a second layer adjacent to said surface having a metal or metal alloy via therein,

    an interlayer connection between metal or metal alloy of said first layer and said metal or metal alloy via comprising a stable alloy region having graded mechanical characteristics, containing a predetermined quantity of alloying material and restricted to an interfacial region of said metal or metal alloy of said first layer and said metal or metal alloy via by a barrier layer,

    wherein said metal alloy of said interlayer connection is formed as an annulus in said metal or metal alloy at a surface of said first layer.

23. (Currently Amended) The integrated circuit as recited in claim ~~21~~ 22, wherein said via extends into said metal or metal alloy of said first layer surrounded by said annulus.